

What is claimed is:

1. A method of using a portable precast slab as a foundation for industrial equipment, comprising:

5 providing a portable precast slab that has a top surface, a plurality of side surfaces, a lower surface, a length of at least about 6 feet, a width of at least about 6 feet, and a thickness of at least about 4 inches, wherein said slab is comprised of concrete or cement;

placing the lower surface of the slab on ground;

leveling the slab and/or checking the level of the slab; and

10 placing at least one piece of industrial equipment on the top surface of the slab

2. The method of Claim 1, further comprising the step of casting reinforcing means into the concrete or cement.

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3. The method of Claim 1, further comprising the step of providing a means for attachment, wherein said means is accessible from the top surface or side surface of said slab.

4. The method of Claim 3, wherein said means for attachment is selected from  
20 the group consisting essentially of at least one lift pin, at least one lift ring, at least one lift bolt, an anchor bolt, or a combination thereof.

5. The method of Claim 3, further comprising the steps of:

attaching a cable to said means for attachment; and

25 moving the slab.

6. The method of Claim 1, wherein the industrial equipment comprises a bulk storage tank.

5 7. The method of Claim 6, further comprising the step of anchoring at least one leg of the bulk storage tank to the slab.

8. The method of Claim 1, further comprising the step of installing fencing around the perimeter of the slab and/or the industrial equipment.

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9. The method of Claim 1, further comprising the steps of:  
using a slab that comprises multiple pieces; and  
placing said pieces adjacent to each other to form the slab.

15 10. The method of Claim 6, further comprising the step of providing a slab having at least about an 8 foot length by about an 8 foot width area on the top surface adjacent to said tank that is available for liquid oxygen delivery after said bulk storage tank is placed on the top surface of said slab.

20 11. The method of Claim 1, further comprising the step of using at least a portion of the slab as a splash pad.

12. The method of Claim 1, wherein the industrial equipment comprises at least one cryogenic liquid pump.

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13. The method of Claim 12, wherein the pad is at least about 6 feet to about 10 feet in width, about 15 feet to about 30 feet in length, and about 4 inches to about 10 inches in thickness.

5 14. The method of Claim 12, wherein the pad is about 8'8" in width by about 24' in length, and about 8" in thickness.

15. A portable precast reinforced slab used as a foundation for industrial equipment, comprising:

10 a precast or premolded slab comprised of concrete or cement, wherein the slab has a top surface, a bottom surface, a plurality of side surfaces, a length, a width, and a thickness; wherein said thickness is at least about 6 inches to about 24 inches, wherein said length is at least about 6 feet, and wherein said width is at least about 6 feet; wherein the concrete or cement is reinforced by reinforcing means; and  
15 wherein during use the slab is level or substantially level and is used as a foundation for industrial equipment.

16. The slab of Claim 15, further comprising means of attachment, wherein said means for attachment is selected from the group consisting essentially of at least one lift pin,  
20 at least one lift ring, at least one lift bolt, at least one anchor bolt, and a combination thereof.

17. The slab of Claim 15, having a plurality of apertures cast into said slab that are visible from the top or side surfaces, wherein said apertures can be used to install fence posts therein.

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18. The slab of Claim 15, having at least one side surface that is shaped and/or sized to interconnect or interface with at least one side surface of another slab.

19. The slab of Claim 15, wherein a plurality of rebars or rods are used as the reinforcing means and are cast into the concrete or cement, and wherein said rebars or rods are placed parallel to one another and/or in a criss-cross fashion.

20. The slab of Claim 15, wherein the industrial equipment comprises a bulk storage tank.

21. The slab of Claim 20, having at least about an 8 foot length by an about 8 foot width area on the top surface adjacent to said tank available for liquid oxygen delivery after the tank is placed upon said slab.

22. The slab of Claim 19, wherein said rebars or rods are formed into a support frame and wherein said means for attachment is removably or securably attached to said support frame.

23. A method of making a precast slab that is used as a foundation for at least one bulk storage tank, comprising:

providing a form;

at least partially filling the form with concrete or cement;

placing at least one means for attachment into the concrete or cement;

filling the form with concrete or cement;

allowing the concrete or cement to dry and/or cure, thereby forming a slab, wherein the slab has a top surface, a bottom surface, a plurality of side surfaces, a length, a width, and a thickness, and wherein said slab is at least about 6 inches thick to about 24 inches thick; and

removing the slab from the form when the concrete or cement is at least partially  
5 dried.

24. The method of Claim 23, further comprising the steps of:

casting a plurality of apertures into said slab that are visible from the top surface;

placing the slab at an industrial site; and

10 installing fence posts into the apertures.

25. The method of Claim 23, further comprising the steps of:

constructing a slab that comprises more than one piece; and

providing at least one side surface in said pieces that are shaped so that said

15 pieces are capable of interconnecting or interfacing to form a slab.

26. The method of Claim 23, further comprising the step of:

casting reinforcing means into the slab.

20 27. The method of Claim 26, further comprising the steps of:

using a plurality of rebars or rods as the reinforcing means in the slab; and

placing said rebars or rods placed parallel to one another and/or in a criss-cross  
fashion.

28. The method of Claim 26, wherein said rebars or rods are arranged to form a three-dimensional support structure.

29. The method of Claim 26, wherein the rebars or rods are prestressed prior to molding.

30. The method of Claim 23, wherein slab is dried and/or cured prior to use.

31. The method of Claim 23, further comprising the step of using concrete or cement of different densities to form said slab.

32. The method of Claim 26, further comprising the step of making a plurality of furrows in the top surface of said slab to ensure drainage of water from the top surface of said slab.

33. A method of using a portable precast slab for use as a splash pad for cryogenic liquids, comprising:

providing a portable precast slab comprised of concrete or cement, wherein said slab has a top surface, a plurality of side surfaces, a lower surface, a length, a width, and a thickness, wherein said length is at least about 6 feet, wherein said width is at least about 6 feet, and wherein said thickness is at least about 2 inches;

placing the lower surface of the slab on ground;

offloading liquid cryogenics over or adjacent to said slab; and

using the top surface of the slab to catch at least a portion of the liquid cryogenics that splash from the offloading of said cryogenics.

34. The method of Claim 33, further comprising the step of casting reinforcing means into the concrete or cement.

5 35. The method of Claim 33, further comprising the step of providing a means for attachment, wherein said means is accessible from the top or side surface of said slab.

36. The method of Claim 35, wherein said means for attachment is selected from the group consisting essentially of at least one lift pin, at least one lift ring, at least one lift bolt, an anchor bolt, and a combination thereof.

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37. The method of Claim 35, further comprising the steps of:  
attaching a cable to said means for attachment; and  
moving the slab.

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38. The method of Claim 33, further comprising the steps of:  
using a slab that comprises multiple pieces; and  
placing said pieces adjacent to each other to form the slab.

20 39. A method for providing a portable precast foundation for a bulk storage tank, comprising:

obtaining a portable precast slab that has a top surface, a plurality of side surfaces, a lower surface, a length, a width, and a thickness, wherein said length is between about 6 feet to about 20 feet, wherein said width is about 6 feet to about 12 feet, and wherein said thickness is about 6 inches to about 24 inches;

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wherein said slab is comprised of reinforced concrete or cement and wherein said concrete or cement is reinforced by means selected from the group consisting essentially of wire, rebar, rods, or a combination thereof;

moving said slab to its desired location;

5 placing the lower surface of the slab on substrate;

leveling the slab and/or checking the level of the slab; and

placing a bulk storage tank upon the top surface of the slab.

40. The method of Claim 39, further comprising the step of casting a means for  
10 attachment into said concrete or cement, wherein said means is accessible from the top or side surface of said slab, and wherein said means is used to move said slab.

41. The method of Claim 40, wherein said means for attachment is selected from the group consisting essentially of at least one lift pin, at least one lift ring, at least one lift  
15 bolt, at least anchor bolt, and a combination thereof.

42. The method of Claim 40, further comprising the step of anchoring at least a part of the bulk storage tank to the slab.

20 43. The method of Claim 40, further comprising the steps of:  
casting apertures into said concrete or cement;  
installing fence posts into said apertures after the slab is placed upon said  
ground;  
attaching fencing to said fence posts; and  
25 installing fencing around the perimeter of the slab and/or the tank.



44. The method of Claim 40, further comprising the step using at least a portion of the slab as a splash pad.

5 45. The method of Claim 39, wherein the width of said slab is about 10 feet.

46. The method of Claim 39, wherein the length of said slab is about 12 feet.

47. The method of Claim 39, wherein the slab is between about 6 inches and 16  
10 inches in thickness.

48. The method of Claim 39, wherein the slab is about 10' in width, about 15' feet in length, and either about 6" in thickness or about 12" in thickness.

15 49. The method of Claim 39, wherein the slab is about 10' in width, about 15' feet in length, and about 16" in thickness.